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Version 1.01

1. IDENTIFICATION OF THE SUBSTANCE/PREPARATION AND OF THE COMPANY/UNDERTAKING**Product identifier****Product name** ROOF PATCH AND REPAIR (AEROSOL)**Recommended use of the chemical and restrictions on use****Product code****Product Type**

Extremely flammable aerosol

Synonyms

None

Supplier's details**Recommended Use**
Uses advised againstSealant. Flat Coatings - FCP.
No information available**Manufactured For:**
Tri-Chem Corporation
431 Stephenson Hwy.
Troy, MI 48083**Emergency telephone number** 800-535-5053

2. HAZARDS IDENTIFICATION

Classification


| | |
|--|----------------|
| Skin corrosion/irritation | Category 2 |
| Serious eye damage/eye irritation | Category 2A |
| Reproductive Toxicity | Category 2 |
| Specific target organ toxicity (single exposure) | Category 3 |
| Specific target organ toxicity (repeated exposure) | Category 2 |
| Aspiration toxicity | Category 1 |
| Flammable aerosols | Category 1 |
| Gases under pressure | Compressed Gas |

GHS Label elements, including precautionary statements

Emergency Overview

DANGER

Hazard Statements
 Causes skin irritation
 Causes serious eye irritation
 Suspected of damaging fertility or the unborn child
 May cause respiratory irritation. May cause drowsiness or dizziness
 May cause damage to organs (Central Nervous System, Eyes, Kidney, Liver, Respiratory System, Peripheral Nervous System, and Skin) through prolonged or repeated exposure.
 May be fatal if swallowed and enters airways
 Extremely flammable aerosol
 Contains gas under pressure; may explode if heated



Appearance opaque **Physical state** Aerosol **Odor** Solvent

Precautionary Statements - Prevention

- Obtain special instructions before use
- Do not handle until all safety precautions have been read and understood
- Wear protective gloves/protective clothing/eye protection/face protection
- Wash face, hands and any exposed skin thoroughly after handling
- Do not breathe dust/fume/gas/mist/vapors/spray
- Use only outdoors or in a well-ventilated area
- Keep away from heat/sparks/open flames/hot surfaces. — No smoking
- Do not spray on an open flame or other ignition source
- Pressurized container: Do not pierce or burn, even after use

Precautionary Statements - Response

- If exposed or concerned: Get medical advice/attention
- IF IN EYES: Rinse cautiously with water for several minutes. Remove contact lenses, if present and easy to do. Continue rinsing.
- If eye irritation persists: Get medical advice/attention
- IF INHALED: Remove person to fresh air and keep comfortable for breathing.
- Call a POISON CENTER or doctor/physician if you feel unwell
- IF SWALLOWED: Immediately call a POISON CENTER or doctor/physician
- Do NOT induce vomiting

Precautionary Statements - Storage

Store locked up

Store in a well-ventilated place. Keep container tightly closed

Protect from sunlight. Do not expose to temperatures exceeding 50 °C/122 °F

Precautionary Statements - Disposal

Dispose of contents/container to an approved waste disposal plant

Hazards not otherwise classified (HNOC)

None

Other information

0% of the mixture consists of ingredient(s) of unknown toxicity

3. COMPOSITION/INFORMATION ON INGREDIENTS

| Chemical Name | CAS-No | Weight %* |
|----------------------------|------------|-----------|
| PROPANE/ISOBUTANE/N-BUTANE | 68476-86-8 | 20-30 |
| PETROLEUM DISTILLATES | 64742-89-8 | 10-20 |
| CALCIUM CARBONATE | 1317-65-3 | 10-20 |
| BUTYL ACETATE | 123-86-4 | 10-20 |
| TOLUENE | 108-88-3 | 10-20 |
| ACETONE | 67-64-1 | 1-10 |

*The exact percentage (concentration) of composition has been withheld as a trade secret.

4. FIRST AID MEASURES**First aid measures for different exposure routes**

| | |
|-----------------------|---|
| General advice | Avoid contact with eyes, skin, and clothing. Avoid breathing vapors mist, or gas. |
| Eye contact | Immediately flush with plenty of water. After initial flushing, remove any contact lenses and continue flushing for at least 15 minutes. Seek immediate medical attention/advice. |
| Skin contact | Wash off immediately with soap and plenty of water. Remove and wash contaminated clothing before re-use. Get medical attention immediately if symptoms occur. |
| Inhalation | Move to fresh air. If not breathing, give artificial respiration. If breathing has stopped, contact emergency medical services immediately. |
| Ingestion | Do NOT induce vomiting. Call a physician immediately. Never give anything by mouth to an unconscious person. Risk of product entering the lungs on vomiting after ingestion. |

Most important symptoms/effects, acute and delayed

| | |
|----------------------|---|
| Main Symptoms | May cause skin and eye irritation. Inhalation causing Central Nervous System effects. Ingestion causing lung damage. |
|----------------------|---|

Indication of immediate medical attention and special treatment needed, if necessary

| | |
|---------------------------|------------------------|
| Notes to physician | Treat symptomatically. |
|---------------------------|------------------------|

5. FIRE-FIGHTING MEASURES

Suitable Extinguishing Media

water fog. Dry chemical. Carbon dioxide (CO2). Cool containers / tanks with water spray.

Unsuitable Extinguishing Media Do not use a solid water stream as it may scatter and spread fire.

Specific hazards arising from the chemical

Extremely flammable/Flammable. Keep product and empty container away from heat and sources of ignition.

Explosion Data

Sensitivity to Mechanical Impact none.

Sensitivity to Static Discharge Yes.

Protective Equipment and Precautions for Firefighters

As in any fire, wear self-contained breathing apparatus pressure-demand, MSHA/NIOSH (approved or equivalent) and full protective gear. Use shielding to protect fire-fighters from bursting containers.

6. ACCIDENTAL RELEASE MEASURES

Personal precautions, protective equipment and emergency procedures

Personal precautions Use with adequate ventilation to keep the exposure levels below the OELS.

Environmental precautions

Environmental precautions Report spills as required by local and federal regulations.

Methods and materials for containment and cleaning up

Methods for Containment Prevent further leakage or spillage if safe to do so.

Methods for cleaning up Contain liquid and collect with an inter,non-combustible material.

7. HANDLING AND STORAGE

Precautions for safe handling

Advice on safe handling May be irritating to eyes. Avoid breathing vapors or mists. Contents under pressure. Do not puncture or incinerate cans. Do not stick pin or any other sharp object into opening on top of can. Use with adequate ventilation. Keep container away from heat, flames, and all other sources of ignition. Keep can away from all sources of electricity such as electric motors and batteries. Do not spray on hot surfaces.

Conditions for safe storage, including any incompatibilities

Technical measures/Storage conditions Keep containers tightly closed in a dry, cool and well-ventilated place.

Incompatible products Store away from strong acids,alkalis, or oxidizing agents.

Aerosol Level 3

8. EXPOSURE CONTROLS/PERSONAL PROTECTION

Control parameters

Exposure Guidelines

| Chemical Name | ACGIH TLV | OSHA PEL | NIOSH IDLH |
|---------------|-----------|----------|------------|
|---------------|-----------|----------|------------|

| | | | |
|--|---|---|---|
| PROPANE/ISOBUTANE/N-BUTANE 68476-86-8 | 74-98-6: TWA: 1000 ppm 106-97-8: STEL: 1000 ppm 75-28-5: STEL: 1000 ppm | 74-98-6:TWA: 1000 ppm TWA: 1800 mg/m ³ (vacated) TWA: 1000 ppm (vacated) TWA: 1800 mg/m ³ 106-97-8: (vacated) TWA: 800 ppm (vacated) TWA: 1900 mg/m ³ | 74-98-6:IDLH: 2100 ppm TWA: 1000 ppm TWA: 1800 mg/m ³ 106-97-8:TWA: 800 ppm TWA: 1900 mg/m ³ 75-28-5:TWA: 800 ppm TWA: 1900 mg/m ³ |
| CALCIUM CARBONATE 1317-65-3 | - | TWA: 15 mg/m ³ total dust TWA: 5 mg/m ³ respirable fraction (vacated) TWA: 15 mg/m ³ total dust (vacated) TWA: 5 mg/m ³ respirable fraction | TWA: 10 mg/m ³ total dust TWA: 5 mg/m ³ respirable dust |
| BUTYL ACETATE 123-86-4 | STEL: 200 ppm TWA: 150 ppm | TWA: 150 ppm TWA: 710 mg/m ³ (vacated) TWA: 150 ppm (vacated) TWA: 710 mg/m ³ (vacated) STEL: 200 ppm (vacated) STEL: 950 mg/m ³ | IDLH: 1700 ppm TWA: 150 ppm TWA: 710 mg/m ³ STEL: 200 ppm STEL: 950 mg/m ³ |
| TOLUENE 108-88-3 | TWA: 20 ppm | TWA: 200 ppm (vacated) TWA: 100 ppm (vacated) TWA: 375 mg/m ³ (vacated) STEL: 150 ppm (vacated) STEL: 560 mg/m ³ Ceiling: 300 ppm | IDLH: 500 ppm TWA: 100 ppm TWA: 375 mg/m ³ STEL: 150 ppm STEL: 560 mg/m ³ |
| ACETONE 67-64-1 | STEL: 500 ppm TWA: 250 ppm | TWA: 1000 ppm TWA: 2400 mg/m ³ (vacated) TWA: 750 ppm (vacated) TWA: 1800 mg/m ³ (vacated) STEL: 2400 mg/m ³ The acetone STEL does not apply to the cellulose acetate fiber industry. It is in effect for all other sectors (vacated) STEL: 1000 ppm | IDLH: 2500 ppm TWA: 250 ppm TWA: 590 mg/m ³ |

ACGIH: (American Conference of Governmental Industrial Hygienists)

OSHA: (Occupational Safety & Health Administration)

NIOSH IDLH: Immediately Dangerous to Life or Health

Other Exposure Guidelines

Vacated limits revoked by the Court of Appeals decision in AFL-CIO v. OSHA, 965 F.2d 962 (11th Cir., 1992).

Exposure controls

Engineering Measures

Ventilation systems. Use adequate ventilation to keep the exposure levels below the OELs.

Individual protection measures, such as personal protective equipment

Eye/Face Protection

Safety glasses with side-shields.

Skin and body protection

Chemical resistant apron. Protective gloves.

Respiratory protection

If exposure limits are exceeded or irritation is experienced, NIOSH/MSHA approved respiratory protection should be worn. Positive-pressure supplied air respirators may be required for high airborne contaminant concentrations. Respiratory protection must be provided in accordance with current local regulations.

Hygiene measures

Handle in accordance with good industrial hygiene and safety practice.

9. PHYSICAL AND CHEMICAL PROPERTIES

Physical and chemical properties

Physical state

Aerosol

| | | | |
|--|---------------------------|--------------------------|---------|
| Appearance | opaque | Odor | Solvent |
| Color | white | Odor Threshold | |
| Property | Values | Remarks • Methods | |
| pH | No information available | | |
| Melting/freezing point | No information available | | |
| Boiling point/boiling range | No information available | | |
| Flash Point | -104.4 °C / -156 °F | Based on propellant | |
| Evaporation rate | No information available | | |
| Flammability (solid, gas) | No information available | | |
| Flammability Limits in Air | | | |
| upper flammability limit | No information available | | |
| lower flammability limit | No information available | | |
| Vapor pressure | No information available | | |
| Vapor density | No information available | | |
| Specific Gravity | 0.870 | | |
| Water solubility | Practically insoluble | | |
| Partition coefficient: n-octanol/water | | | |
| Autoignition temperature | No information available | Not applicable | |
| Decomposition temperature | | | |
| Viscosity | No information available | | |
| Explosive properties | | | |
| Other information | | | |
| VOC Content(%) | 62.11 | | |
| MIR Value | 1.01 | | |
| MIR Coating Category | FCP - Flat Coatings <1.20 | | |

10. STABILITY AND REACTIVITY

Reactivity
No data available

Chemical stability
Stable under recommended storage conditions.

Possibility of hazardous reactions
None under normal processing.

Conditions to Avoid
Extremes of temperature and direct sunlight.

Incompatible Materials
Store away from strong acids,alkalis, or oxidizing agents.

Hazardous Decomposition Products
Carbon oxides.

11. TOXICOLOGICAL INFORMATION

Information on likely routes of exposure

| | |
|----------------------------|---|
| Product Information | Product does not present an acute toxicity hazard based on known information |
| Inhalation | Exposure to high vapour concentrations may cause nervous systems effects such as headache, nausea, and dizziness. |
| Eye contact | Irritating to eyes. |
| Skin contact | Irritating to skin. Prolonged skin contact may defat the skin and produce dermatitis. |

Ingestion Not acutely toxic. Aspiration into the lungs during swallowing may be harmful.

Component Information

| Chemical Name | LD50 Oral | LD50 Dermal | LC50 Inhalation |
|-------------------------------------|-----------------------|--------------------------|---------------------------------------|
| PETROLEUM DISTILLATES 64742-89-8 | - | = 3000 mg/kg (Rabbit) | - |
| BUTYL ACETATE 123-86-4 | = 10768 mg/kg (Rat) | > 17600 mg/kg (Rabbit) | = 390 ppm (Rat) 4 h |
| TOLUENE 108-88-3 | = 2600 mg/kg (Rat) | = 12000 mg/kg (Rabbit) | = 12.5 mg/L (Rat) 4 h |
| ACETONE 67-64-1 | = 5800 mg/kg (Rat) | - | = 50100 mg/m ³ (Rat) 8 h |

Information on toxicological effects

Symptoms Causes eye , skin, and respiratory irritation .Aspiration into the lungs during swallowing may be harmful and cause lung damage.

Delayed and immediate effects as well as chronic effects from short and long-term exposure

Skin corrosion/irritation Irritating to skin.
Eye damage/irritation Irritating to eyes.
Sensitization None known.
Germ Cell Mutagenicity Not a germ cell mutagen.
Carcinogenicity The table below indicates whether each agency has evaluated a listed ingredient as a carcinogen.

| Chemical Name | ACGIH | IARC | NTP | OSHA |
|---------------------|-------|---------|-----|------|
| TOLUENE 108-88-3 | - | Group 3 | - | - |

ACGIH: (American Conference of Governmental Industrial Hygienists)

A3 - Animal Carcinogen

IARC: (International Agency for Research on Cancer)

Group 3 - Not Classifiable as to Carcinogenicity in Humans

Group 2B - Possibly Carcinogenic to Humans

OSHA: (Occupational Safety & Health Administration)

X - Present

Reproductive toxicity Suspected of damaging fertility or the unborn child.
Specific target organ systemic toxicity (single exposure) May cause respiratory irritation. may cause drowsiness and dizziness.
Specific target organ systemic toxicity (repeated exposure) May cause damage to organs through prolonged or repeated exposure.
Chronic toxicity Intentional misuse by deliberately concentrating and inhaling contents may be harmful or fatal. Chronic hydrocarbon abuse has been associated with irregular heart rhythms and potential cardiac arrest. Prolonged skin contact may defat the skin and produce dermatitis. May cause adverse liver effects.
Target Organ Effects Central Nervous System (CNS), Eyes, Kidney, Liver, Respiratory system, Skin, Peripheral Nervous System (PNS).
Aspiration hazard May be fatal if swallowed and enters airways.

Numerical measures of toxicity - Product Information

Unknown Acute Toxicity 0% of the mixture consists of ingredient(s) of unknown toxicity

The following values are calculated based on chapter 3.1 of the GHS document .

ATEmix (oral) 18597 mg/kg

ATEmix (dermal) 9949 mg/kg

ATEmix (inhalation-dust/mist) 72.4 mg/l

ATEmix (inhalation-vapor) 195918 mg/l

12. ECOLOGICAL INFORMATION

Ecotoxicity

| Chemical Name | Toxicity to algae | Toxicity to fish | Toxicity to microorganisms | Toxicity to daphnia and other aquatic invertebrates |
|--|---|--|----------------------------|--|
| PROPANE/ISOBUTANE/N-BUTANE 68476-86-8 | - | - | - | - |
| PETROLEUM DISTILLATES 64742-89-8 | 4700 mg/L EC50 Pseudokirchneriella subcapitata 72h | - | - | - |
| BUTYL ACETATE 123-86-4 | 674.7 mg/L EC50 Desmodemus subspicatus 72h | 100 mg/L LC50 Lepomis macrochirus 96h static 17 - 19 mg/L LC50 Pimephales promelas 96h flow-through | - | - |
| TOLUENE 108-88-3 | 433 mg/L EC50 Pseudokirchneriella subcapitata 96h 12.5 mg/L EC50 Pseudokirchneriella subcapitata 72h static | 15.22 - 19.05 mg/L LC50 Pimephales promelas 96h flow-through 12.6 mg/L LC50 Pimephales promelas 96h static 5.89 - 7.81 mg/L LC50 Oncorhynchus mykiss 96h flow-through 14.1 - 17.16 mg/L LC50 Oncorhynchus mykiss 96h static 5.8 mg/L LC50 Oncorhynchus mykiss 96h semi-static 11.0 - 15.0 mg/L LC50 Lepomis macrochirus 96h static 54 mg/L LC50 Oryzias latipes 96h static 28.2 mg/L LC50 Poecilia reticulata 96h semi-static 50.87 - 70.34 mg/L LC50 Poecilia reticulata 96h static | - | 5.46 - 9.83 mg/L EC50 Daphnia magna 48h Static 11.5 mg/L EC50 Daphnia magna 48h |
| ACETONE 67-64-1 | - | 4.74 - 6.33 mL/L LC50 Oncorhynchus mykiss 96h 6210 - 8120 mg/L LC50 Pimephales promelas 96h static 8300 mg/L LC50 Lepomis macrochirus 96h | - | 10294 - 17704 mg/L EC50 Daphnia magna 48h Static 12600 - 12700 mg/L EC50 Daphnia magna 48h |

Persistence and degradability

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Bioaccumulation

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| Chemical Name | log Pow |
|--|---------|
| PROPANE/ISOBUTANE/N-BUTANE 68476-86-8 | <=2.8 |
| BUTYL ACETATE 123-86-4 | 1.81 |
| TOLUENE 108-88-3 | 2.65 |
| ACETONE 67-64-1 | -0.24 |

Other adverse effects

No information available

13. DISPOSAL CONSIDERATIONS

Waste treatment

Waste Disposal Methods

Dispose of in accordance with federal, state, and local regulations.

Contaminated packaging

Do not re-use empty containers.

14. TRANSPORT INFORMATION

DOT Ground CONSUMER COMMODITY ORM-D
or
LIMITED QUANTITY

IATA UN1950, AEROSOLS, FLAMMABLE, 2.1, LTD. QTY.

IMDG UN1950, AEROSOLS, 2.1,LTD.QTY.

15. REGULATORY INFORMATION

International Inventories

| Chemical Name | TSCA | DSL/NDSL | EINECS/ELI NCS | ENCS | IECSC | KECL | PICCS | AICS |
|----------------------------|------|----------|-------------------|------------|-------|------|-------|------|
| PROPANE/ISOBUTANE/N-BUTANE | X | X | X | Not listed | X | X | X | X |
| PETROLEUM DISTILLATES | X | X | X | Not listed | X | X | X | X |
| CALCIUM CARBONATE | X | X | X | X | X | X | X | X |
| BUTYL ACETATE | X | X | X | X | X | X | X | X |
| TOLUENE | X | X | X | X | X | X | X | X |
| ACETONE | X | X | X | X | X | X | X | X |

Legend:

TSCA - United States Toxic Substances Control Act Section 8(b) Inventory
DSL/NDSL - Canadian Domestic Substances List/Non-Domestic Substances List
EINECS/ELINCS - European Inventory of Existing Commercial Chemical Substances/EU List of Notified Chemical Substances
ENCS - Japan Existing and New Chemical Substances
CHINA - China Inventory of Existing Chemical Substances
KECL - Korean Existing and Evaluated Chemical Substances
PICCS - Philippines Inventory of Chemicals and Chemical Substances
AICS - Australian Inventory of Chemical Substances

U.S. Federal Regulations

SARA 313

Section 313 of Title III of the Superfund Amendments and Reauthorization Act of 1986 (SARA). This product contains a chemical or chemicals which are subject to the reporting requirements of the Act and Title 40 of the Code of Federal Regulations, Part 372:

| Chemical Name | CAS-No | Weight %* | SARA 313 - Threshold Values % |
|--------------------|----------|-----------|-------------------------------|
| TOLUENE - 108-88-3 | 108-88-3 | 10-20 | 1.0 |

SARA 311/312 Hazard Categories

Acute Health Hazard Yes
Chronic Health Hazard Yes
Fire Hazard Yes
Sudden Release of Pressure Hazard Yes
Reactive Hazard no

Clean Water Act

This product contains the following substances which are regulated pollutants pursuant to the Clean Water Act (40 CFR 122.21 and 40 CFR 122.42):

| Chemical Name | CWA - Reportable Quantities | CWA - Toxic Pollutants | CWA - Priority Pollutants | CWA - Hazardous Substances |
|---------------------------|-----------------------------|------------------------|---------------------------|----------------------------|
| BUTYL ACETATE 123-86-4 | 5000 lb | | | X |
| TOLUENE 108-88-3 | 1000 lb | X | X | X |

CERCLA

This material, as supplied, contains one or more substances regulated as a hazardous substance under the Comprehensive Environmental Response Compensation and Liability Act (CERCLA) (40 CFR 302):

| Chemical Name | Hazardous Substances RQs | Extremely Hazardous Substances RQs | RQ |
|---------------------------|--------------------------|------------------------------------|--|
| BUTYL ACETATE 123-86-4 | 5000 lb | | RQ 5000 lb final RQ RQ 2270 kg final RQ |
| TOLUENE 108-88-3 | 1000 lb 1 lb | | RQ 1000 lb final RQ RQ 454 kg final RQ RQ 1 lb final RQ RQ 0.454 kg final RQ |
| ACETONE 67-64-1 | 5000 lb | | RQ 5000 lb final RQ RQ 2270 kg final RQ |

U.S. State Regulations

California Proposition 65

This product contains the following Proposition 65 chemicals:

| Chemical Name | California Prop. 65 |
|--------------------|---------------------|
| TOLUENE - 108-88-3 | Developmental |

U.S. State Right-to-Know Regulations

| Chemical Name | New Jersey | Massachusetts | Pennsylvania |
|-------------------------------------|------------|---------------|--------------|
| PETROLEUM DISTILLATES 64742-89-8 | | | X |
| CALCIUM CARBONATE 1317-65-3 | X | X | X |
| BUTYL ACETATE 123-86-4 | X | X | X |
| TOLUENE 108-88-3 | X | X | X |
| ACETONE 67-64-1 | X | X | X |

EPA Pesticide Registration Number Not applicable

Canada

This product has been classified in accordance with the hazard criteria of the Controlled Products Regulations (CPR) and the SDS contains all the information required by the CPR.

16. OTHER INFORMATION

| | | | | |
|-----------------------------------|---|----------------|-------------------|---------------------------------|
| NFPA | Health Hazard 2 | Flammability 4 | Instability 0 | Physical and chemical hazards - |
| HMIS | Health Hazard 2* | Flammability 4 | Physical Hazard 1 | Personal protection B |
| <i>Chronic Hazard Star Legend</i> | <i>Chronic Health Hazard Repeated or prolonged exposure may cause central nervous system damage</i> | | | |

| | |
|---------------|--------------------|
| Prepared By | Regulatory Affairs |
| Issuing date | 10-Mar-2016 |
| Revision Date | 10-Mar-2016 |
| Revision Note | |

Disclaimer

The information provided on this SDS is correct to the best of our knowledge, information and belief at the date of its publication. The information given is designed only as a guide for safe handling, use, processing, storage, transportation, disposal and release and is not to be considered as a warranty or quality specification. The information relates only to the specific material designated and may not be valid for such material used in combination with any other material or in any process, unless specified in the text.

End of Safety Data Sheet